

**We claim:**

1. A fatliquoring agent for the production and/or treatment of leather and hides, comprising

5

A) a mixture of modified natural oils containing

- a1) at least one oxidized sulfited natural oil and  
a2) at least one oxidized sulfated natural oil,

10

B) an emulsifier mixture containing

- b1) at least one C<sub>6</sub>- to C<sub>14</sub>-alkanol alkoxyated with from 4 to 12 alkylene oxide units,  
b2) at least one C<sub>12</sub>- to C<sub>24</sub>-alkanol alkoxyated with from 15 to 40 alkylene oxide units and  
b3) at least one C<sub>12</sub>- to C<sub>24</sub>-alkanol alkoxyated with from 50 to 100 alkylene oxide units, and

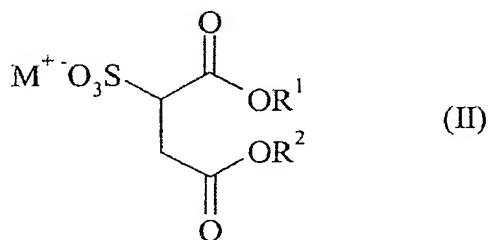
15

20

C) if required, a linear, cyclic or branched polymer of a dialkylsilanediol SiR<sub>2</sub>(OH)<sub>2</sub>, where R is methyl, ethyl, n-propyl or phenyl, and/or

D) if required, a compound of the formula (II)

25



30

where R<sup>1</sup> and R<sup>2</sup> are identical or different and, independently of one another, are selected from the group consisting of H, M, saturated linear aliphatic C<sub>1</sub>- to C<sub>18</sub>-alkyl and saturated branched aliphatic C<sub>3</sub>- to C<sub>18</sub>-alkyl, where at least one of the two radicals R<sup>1</sup> and R<sup>2</sup> ≠ H, M with M = alkali metal or 0.5 alkaline earth metal, and  
M<sup>+</sup> is selected from the group consisting of H<sup>+</sup>, NH<sub>4</sub><sup>+</sup>, alkali metal<sup>+</sup> and 0.5 alkaline earth metal<sup>+</sup>.

2. The fatliquoring agent as claimed in claim 1, wherein the oxidized sulfited natural oil is obtained by oxidizing natural oil so that the difference  $\Delta d$  between the specific gravities of the unoxidized and oxidized natural oil is from 0.01 to 0.1, preferably from 0.03 to 0.05, g/ml and then reacting the natural oil oxidized in this manner with from 2 to 8, preferably from 3 to 5, % by weight, based on its weight, of a sulfite - calculated as sodium bisulfite ( $\text{Na}_2\text{S}_2\text{O}_5$ ),  
and  
wherein fatliquoring agent as claimed in any of claims 1 to 3, wherein the oxidized, sulfated natural oil is obtained by oxidizing natural oil so that the difference  $\Delta d$  between the specific gravities of the unoxidized and oxidized natural oil is from 0.01 to 0.1, preferably from 0.03 to 0.05, g/ml and then reacting the natural oil oxidized in this manner with from 3 to 9, preferably from 4 to 8, % by weight, based on its weight, of  $\text{H}_2\text{SO}_4$  - calculated as 98% strength by weight aqueous  $\text{H}_2\text{SO}_4$  solution.
3. The fatliquoring agent as claimed in any of claims 1 or 2, wherein the emulsifier mixture B contains from 20 to 60, preferably from 25 to 50, particularly preferably from 28 to 40, % by weight of component b1 or of a mixture of the components b1, from 20 to 70, preferably from 25 to 60, particularly preferably from 30 to 45, % by weight of a component b2 or of a mixture of the components b2 and from 10 to 50, preferably from 15 to 40, particularly preferably from 22 to 32, % by weight of a component b3 or of a mixture of the components b3 - based in each case on the total weight of the emulsifier mixture.
4. The fatliquoring agent as claimed in any of claims 1 to 3, wherein component b1 is at least one  $\text{C}_8$ - to  $\text{C}_{12}$ -alkanol alkoxylation with from 4 to 12 alkylene oxide units, preferably at least one  $\text{C}_{10}$ -alkanol alkoxylation with from 4 to 12 alkylene oxide units, and/or component b2 is at least one  $\text{C}_{14}$ - to  $\text{C}_{20}$ -alkanol alkoxylation with from 15 to 40 alkylene oxide units, preferably a  $\text{C}_{16}$ - to  $\text{C}_{18}$ -alkanol alkoxylation with from 15 to 40 alkylene oxide units, and/or component b3 is at least one  $\text{C}_{14}$ - to  $\text{C}_{20}$ -alkanol alkoxylation with from 50 to 100 alkylene oxide units, preferably a  $\text{C}_{16}$ - to  $\text{C}_{18}$ -alkanol alkoxylation with from 50 to 100 alkylene oxide units.

5. The fatliquoring agent as claimed in any of claims 1 to 4, wherein the polymer of the formula (I) has a viscosity of from 30 to 1 000, preferably from 80 to 500, mPa·s, measured in the pure substance at 20°C.
- 5 6. The fatliquoring agent as claimed in any of claims 1 to 5, wherein, in the compound of the formula (II),  $R^1$  and  $R^2$ , independently of one another, are selected from the group consisting of methyl, ethyl, propyl, isopropyl, n-butyl, sec-butyl, tert-butyl, n-pentyl, isopentyl, n-hexyl, 2-ethylhexyl, n-octyl, n-dodecyl, n-tridecyl, n-tetradecyl and n-hexadecyl and/or  $M^+$  is  $H^+$  or  $Na^+$ .
- 10
7. The fatliquoring agent as claimed in any of claims 1 to 6, which contains from 45 to 98, preferably from 70 to 96, particularly preferably from 78 to 95, % by weight of a component A or of a mixture of components A, from 2 to 15, preferably from 3 to 10, particularly preferably from 3 to 8, % by weight of a component B or of a mixture of components B, and from 0 to 20, preferably from 0.5 to 10, particularly preferably from 1 to 7, % by weight of a component C or of a mixture of components C, and from 0 to 20, preferably from 0.5 to 10, particularly preferably from 1 to 7, % by weight of a component D or of a mixture of components D, based in each case on the total weight of the fatliquoring agent.
- 15
8. Aqueous composition for the production and/or treatment of leather and hides, comprising 40 to 80 % by weight of a fatliquoring agent as claimed in any of claims 1 to 7.
- 20
9. The use of a fatliquoring agent as claimed in any of claims 1 to 7 or of a composition as claimed in claim 8 the leather or hides are treated with aqueous fattening liquors containing fatliquoring agents as claimed in any of claims 1 to 7 in the production and/or treatment of leather and hides.
- 25
10. A process for fatliquoring in the production and/or treatment of leather and hides, wherein from 40 to 80, preferably from 50 to 80, particularly preferably from 60 to 75, % by weight of a fatliquoring agent as claimed in any of claims 1 to 11.
- 30
- 35